

Coronary artery calcium score improves CHD risk prediction

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(HealthDay)—Inclusion of the coronary artery calcium (CAC) score improves coronary heart disease (CHD) risk prediction, while the absence of CAC reclassifies many patients as not eligible for statins, according to two studies published in the Oct. 13 issue of the *Journal of the American College of Cardiology*.

Robyn L. McClelland, Ph.D., from the University of Washington in Seattle, and colleagues derived and validated a novel risk score to estimate 10-year CHD risk using CAC and other traditional risk factors. The algorithm was developed in the Multi-Ethnic Study of Atherosclerosis (MESA) cohort involving 6,814 participants. The researchers observed significant improvement in [risk prediction](#) with inclusion of CAC in the MESA risk score (C-statistic, 0.80 versus 0.75; P

Khurram Nasir, M.D., M.P.H., from Baptist Health South Florida in Miami, and colleagues examined the implications of the absence of CAC in reclassifying patients from a risk stratum in which [statins](#) are recommended to one in which they are not. Data were included from 4,758 participants from the MESA cohort. The researchers found that for most of the 50 percent of participants eligible for statins, eligibility was due to having a 10-year estimated atherosclerotic cardiovascular disease risk of ≥ 7.5 percent. Forty-one percent of those recommended statins had CAC = 0. Of the [participants](#) eligible (recommended or considered) for statins, 44 percent had CAC = 0 at baseline.

"The absence of CAC reclassifies approximately one-half of candidates as not eligible for statin therapy," the authors write.

One author from the McClelland study disclosed [financial ties](#) to General Electric. Several authors from the Nasir study disclosed financial ties to the pharmaceutical, biotechnology, and technology industries.

More information: [Full Text - McClelland \(subscription or payment may be required\)](#)

[Editorial \(subscription or payment may be required\)](#)

[Full Text - Nasir \(subscription or payment may be required\)](#)

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